



Iowa Governor's STEM Advisory Council

dedicated to building a strong STEM education foundation for all Iowans

2013-14 Scale-Up Initiative

A World In Motion

Project Description/Objectives:

SAE International's *A World In Motion*® (AWIM) program is a teacher-administered program that brings science, technology, engineering and math (STEM) education to life in the classroom. The AWIM program provides age-appropriate multidisciplinary hands-on experiences for students. Each AWIM activity is benchmarked to national standards, and combines a comprehensive curriculum built around the AWIM Engineering Design Experience. This problem solving process allows students to work within a structure to solve a “challenge” to design, build, and test a prototype, then defend their design through a presentation.

Grade Levels:

AWIM challenges are built within the structure of current primary, elementary, and middle school education. AWIM challenges are somewhat interchangeable and not tied directly to any one independent grade level as varying educational standards influence the content teachers are responsible for covering at each level. The AWIM design allows for instructional flexibility to enable teachers to address specific outlined content/core concepts as appropriate for instruction within their particular state standards.

Primary Challenges (K-3) http://www.awim.org/curriculum/primary/	Elementary Challenges (4-6) http://www.awim.org/curriculum/elementary/	Middle School Challenges (6-8) http://www.awim.org/curriculum/middleschool/
Rolling Things Challenge	Skimmer Challenge	Gravity Cruiser Challenge*
Pinball Designers Challenge	JetToy Challenge	Motorized Toy Car Challenge
Engineering Inspired By Nature Challenge	Gravity Cruiser Challenge*	Glider Challenge
Straw Rockets Challenge		Fuel Cell Challenge

What is Provided by the Project:

- **Professional Development**
Teachers receive one day of professional development. PD will take place in each STEM Scale-Up Hub at central locations. Teachers will receive PD customized to primary, elementary or middle school levels.
- **AWIM Curriculum & Classroom Materials**
Participating teachers will receive AWIM kit-based learning material (each kit serves 24+/- students). AWIM kits include the full AWIM curriculum and materials required for program delivery.
- **Sub Reimbursement**
\$120 per teacher attending training will be reimbursed to the school
- **Teacher Travel Reimbursement**
\$50 to cover teacher travel to/from training location
- **Ongoing Implementation Support & Resources**

What is Required by the School or local education agency (LEA) in order to implement this program:

- Attendance/Participation of Implementing Teachers in Professional Development
- Timely Completion of AWIM Experience in the Classroom
- Outcome Reporting (as deemed appropriate by Regional STEM Hub Manager)
- Agreement to Use/Implement Material Received Through Scale-Up Funding

Website to view program and Standards Alignment: www.awim.org

Program Video: <http://www.awim.org/videos/video-player-awim.htm>